5

CONVERSATIONAL NETWORKING VIA TRANSPORT, CODING AND CONTROL CONVERSATIONAL PROTOCOLS

ABSTRACT OF THE DISCLOSURE

Conversational protocols for implementing distributed conversational networking architectures and/or distributed conversational applications, as well as real-time conversational computing between network-connected pervasive computing devices and/or servers over a computer network. In one aspect of the invention, a communication stack for use in a real-time distributed conversational network comprises a first layer for generating encoded audio data, a second layer for wrapping encoded audio data in a real-time encoded audio data stream, and a third layer for wrapping control messages in a real-time control data stream for real-time control of conversational distributed functions over the network. Preferably, the communication stack comprises extensions of RTP (Real Time Protocol) and RTCP (Real Time Control Protocol) to respectively transmit, in real-time, the necessary encoded audio data and control data for executing and controlling distributed conversational functions, wherein meta information associated with the real-time encoded audio stream is added as an extension of a

20

5

header of an RTP packet, and wherein meta information associated with the real-time control data stream is added as an extension of a header of an RTCP (Real Time Control Protocol) packet. The control data may comprise any type of application-specific control data that is needed for implemented a specific distributed framework.